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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/731,541

12/08/2003

Yan Feng

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EXAMINER

WU, RUTAO

ART UNIT

PAPER NUMBER

3628

SHORTENED STATUTORY PERIOD OF RESPONSE	MAIL DATE	DELIVERY MODE
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3 MONTHS

01/25/2007

PAPER

**Please find below and/or attached an Office communication concerning this application or proceeding.**

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

<b>Office Action Summary</b>	<b>Application No.</b> 10/731,541	<b>Applicant(s)</b> FENG ET AL.	
	<b>Examiner</b> Rob Wu	<b>Art Unit</b> 3628	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

#### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

#### Status

- 1) ☒ Responsive to communication(s) filed on 08 December 2003.
- 2a) ☐ This action is **FINAL**.                      2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

#### Disposition of Claims

- 4) ☒ Claim(s) 1-33 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-33 is/are rejected.
- 7) ☒ Claim(s) 10, 16 and 19 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

#### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

#### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All    b) ☐ Some \*    c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

#### Attachment(s)

- |   |   |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892)   | 4) <input type="checkbox"/> Interview Summary (PTO-413)<br>Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948)  | 5) <input type="checkbox"/> Notice of Informal Patent Application                       |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)<br>Paper No(s)/Mail Date <u>12/08/2003</u> | 6) <input type="checkbox"/> Other: _____  |

## **DETAILED ACTION**

### ***Information Disclosure Statement***

1. The listing of references in the specification is not a proper information disclosure statement. 37 CFR 1.98(b) requires a list of all patents, publications, or other information submitted for consideration by the Office, and MPEP § 609.04(a) states, "the list may not be incorporated into the specification but must be submitted in a separate paper." Therefore, unless the references have been cited by the examiner on form PTO-892, they have not been considered.

### ***Claim Objections***

2. Claims 10, 16 and 19 are objected to because of the following informalities: claim cannot depend from itself. To expedite the prosecution claims 10 and 16 are assumed to depend from claim 1, and claim 19 is assumed to depend from claim 18. Appropriate correction is required.

### ***Claim Rejections - 35 USC § 102***

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States

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only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 18-21, 23, 25-27, 30-33 are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. Pat No. 7,092,918 to Delurgio et al.

**Referring to claim 18:**

In an automated pricing system for calculating pricing for items and item orders, the pricing system having a server node for serving pricing information, a pricing application for calculating the pricing information served, and a software application for creating monitoring and optimizing deals, a method for optimizing the parameters of a deal scenario comprising steps of:

- (a) through a graphical user interface, highlighting the deal scenario; (Fig 7)
- (b) through the same interface, activating a deal optimization option from a menu of options provided for the purpose; (Fig 10-16)
- (c) executing an advisory factor command as a result of the selection of step (b); (col 17: lines 33-37);
- (d) using the correct item and order sequences, calculating at least one separate scenario according to the factor rules; (Fig 17c, Fig 18, Fig 21 and associated specification) and
- (e) displaying the at least one calculated scenario in the graphical user interface for consideration of further options. (Fig 22 and associated specification)

**Referring to claim 19:**

The method of claim 19 wherein in step (a) the deal scenario has at least the items of the scenario, the prices of the items, the quantities of the items, and the order totals of the scenario. (Fig 22)

**Referring to claim 20:**

The method of claim 19 wherein in step (a) the graphical user interface is accessible through the Internet network using a Web-browsing application. (col 7: lines 38-45)

**Referring to claim 21:**

The method of claim 18 wherein in step (a) the deal scenario is one of a one time order or a contract order with complete pricing parameters for item, and order totals including discounts. (Fig 22, 22A, 22B)

**Referring to claim 23:**

The method of claim 18 wherein in step (c) the advisory factor is one of an up-sell factor, a cross-sell factor, a competitor factor, or a maximize factor. (col 17: lines 35-37)

**Referring to claim 25:**

The method of claim 18 wherein in step (c) the advisory factor is used in it's own advisory sequence containing only advisory factors. (Fig 18; col 17: lines 33-37, 41-45)

**Referring to claim 26:**

The method of claim 18 wherein in step (d) the separate scenario is the highest ranked of more than on scenario returned from calculation. (Fig 24A)

**Referring to claim 27:**

The method of claim 18 wherein in step (d) the correct item and order sequences are defined for item as the one containing the advisory factor and for order as the one containing the ranking factor. (col 17: lines 30-45)

**Referring to claim 30:**

The method of claim 18 wherein in step (c) the advisory factor is competitor and in step (d) the calculated scenarios represent the original scenario using applicable competitor products and pricing. (Fig 26 bar soap and liquid soap)

**Referring to claim 31:**

The method of claim 18 wherein in step (c) the advisory factor is maximized and in step (d) the calculated scenarios represent product distribution strategies over multiple shipping period. (Fig 21)

**Referring to claim 32:**

The method of claim 18 wherein in step (d) a ranking factor is included in the order sequence, the ranking factor for ranking results according to a specified goal-based parameter. (Fig 18 and associated specification)

**Referring to claim 33:**

The method of claim 18 wherein in step (e) further options include product editing, discount editing, final editing and save scenario. (Fig 23, Fig 25, Fig 27, Fig 33 and associated specification)

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 1-17, 22, 24, 28-30 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Pat No. 7,092,918 to Delurgio et al.

**Referring to claim 1:**

In an automated pricing system for calculating pricing for items and item orders, the pricing system having a server node for serving pricing information, a pricing application for calculating the pricing information served, and a data repository for storing at least one pricing data model and rules for manipulating the model, a software application for creating, monitoring, and optimizing deals comprising:

A graphical user interface for accessing and directing the application; (Fig 7)

A set of advisory factors having rules and attributes associated thereto (col 17: lines 33-37);

A set of related calculating sequences for calculating results using at least one of the advisory factors in sequence (col 17: lines 33-37); and

Delurgio et al does not expressly disclose least one ranking factor for optimizing results returned by the set of calculating sequences. However, Delurgio et al does disclose allowing the user to view the optimization results according to different options. (Fig 18; col 17: lines 41-45) Therefore, it is obvious from the disclosure that when user

chose options (contribution margin method option, revenue method option..)to view the results then the results are ranked according to the chosen option.

Characterized in that a user operating through the graphical user interface initiates a set of calculation sequences related by factor to one or more possible options associated with a deal, the calculation sequences cooperating to return a list of data structures for user consideration, the list of data structures ranked according to one or more goal-based attributes. (Fig 15-17)

**Referring to claim 2:**

The software application of claim 1 wherein the software interface is accessible through the Internet network using a Web-browsing application. (col 7: lines 38-45)

**Referring to claim 3:**

The software application of claim 1 wherein each advisory factor within the set of advisory factors emulates a possible option for optimizing a deal. (col 9: lines 10-13)

**Referring to claim 4:**

Delurgio et al disclose optimizing factors such as unit volume, revenue, equivalent retail price, product cost, gross margin, variable cost, contribution margin, overhead allocation, and net profit. (col 17: lines 35-37) Delurgio et al also disclose optimization based on cross sell or competitor products (Fig 26 bar soap and liquid soap). Delurgio et al does not expressly disclose that the factors include an up-sell factor, a cross-sell factor, a competitor factor. However, it would have been obvious at the time of the invention for Delurgio et al to include optimization factors such as up-sell, cross-sell, competitor. Delurgio et al provides specific motivation by disclosing that any



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well understood merchandising lever, the manipulation of whose attributes can be quantified and estimated with respect to consumer demand and whose associated costs can be determined via an activity based cost model are contemplated by the intention.

(col 22: lines 60-64)

**Referring to claim 5:**

The software application of claim 1 wherein the set of calculation sequences include an item sequence and an order sequence, the item sequence containing an advisory factor and the order sequence containing the at least one ranking factor, which performs the ranking according to a goal-based attribute. (Fig 18; col 17: lines 33-37, 41-45)

**Referring to claim 6:**

The software application of claim 1 wherein the set of calculation sequences include at least one advisory sequence that is not an item or an order sequence. (col 17: lines 33-37)

**Referring to claim 7:**

Delurgio et al disclose ranking factors such as contribution margin, revenue method (col 17: lines 41-45) Delurgio et al does not expressly disclose ranking factors such as cost-based, inventory-based, budget-based and competitive-based. However, it would have been obvious at the time of the invention for Delurgio et al to include ranking factors such as cost-based, inventory-based, budget-based and competitive-based. Delurgio et al provides specific motivation by disclosing that any well understood merchandising lever, the manipulation of whose attributes can be quantified

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and estimated with respect to consumer demand and whose associated costs can be determined via an activity based cost model are contemplated by the intention. (col 22: lines 60-64)

**Referring to claim 8:**

The software application of claim 1 wherein the at least one ranking factor can be set to optimize or minimize according to a goal-based attribute. (col 17: lines 30-35)

**Referring to claim 9:**

Delurgio et al disclose the ability to optimize product prices based on substitution products (Fig 26, Bar soap and liquid soap). Delurgio et al does not expressly disclose data structures represents possible up-sell product substitution options ranked to maximize revenue or margin for an enterprise. However, since Delurgio et al is capable of optimizing based on substitution products it would have been obvious to one skilled in the arts at the time of the invention to optimize based on up-sell productions. Delurgio et al would be motivated to be able to consider all factors when performing optimization.

**Referring to claim 10:**

The software application of claim 1 wherein the returned list of data structures include complete item and order pricing information for each substitution options. (Fig 26)

**Referring to claim 11:**

The software application of claim 1 wherein the ranking factor is used to distribute product quantities over multiple shipping periods of a contract order according to a goal-based attribute. (col 17: lines 56-59)

**Referring to claim 12:**

Delurgio et al disclose the ability to optimize product prices based on substitution products (Fig 26, Bar soap and liquid soap). Delurgio et al does not expressly disclose data structures represents possible cross-sell product addition options ranked to maximize revenue or margin for an enterprise. However, since Delurgio et al is capable of optimizing based on similar products it would have been obvious to one skilled in the arts at the time of the invention to optimize based on cross-sell productions. Delurgio et al would be motivated to be able to consider all factors when performing optimization.

**Referring to claim 13:**

Delurgio et al disclose the ability to optimize product prices based on competitor products (Fig 26, Bar soap and liquid soap). Delurgio et al does not expressly disclose data structures represents corresponding competitor products and pricing along side of enterprise products and pricing, the data structures ranked according to most competitive products. However, since Delurgio et al is capable of optimizing based on competitor products it would have been obvious to one skilled in the arts at the time of the invention to optimize based on competitor products. Delurgio et al would be motivated to be able to consider all factors when performing optimization.

**Referring to claim 14:**

The software application of claim 1 wherein the returned list of data structures is a product distribution strategy over multiple shipment periods of a contract the distribution strategy ranked by maximizing revenue, margin, or by minimizing cost provision of the products for each period. (col 17: lines 56-59; Fig 18)

**Referring to claim 15:**

The software application of claim 1 wherein the graphical user interface enables displayed side-by-side value comparison of two or more scenarios resulting from one or more factor sequences executed to return data structures, the data structures optionally selected to create the scenarios being compared. (Fig 18, Fig 24A)

**Referring to claim 16:**

The software application of claim 1 wherein the graphical user interface supports request and generation of graphics of the form of graph and chart representations of various compared scenarios. (Fig 18, Fig 26)

**Referring to claim 17:**

The software application of claim 1 wherein the deals are contracts with multi-shipping periods, which are monitored for one of competitor pricing parameters per shipping period per item having competitor pricing data or monitored for product distribution optimization per item per shipping period, the product distribution strategy ranked according to a goal-based attribute. (Fig 21, col 17: lines 41-45)

**Referring to claim 22:**

Delurgio et al disclose optimizing factors such as unit volume, revenue, equivalent retail price, product cost, gross margin, variable cost, contribution margin, overhead allocation, and net profit. (col 17: lines 35-37) Delurgio et al also disclose optimization based on cross sell or competitor products (Fig 26 bar soap and liquid soap). Delurgio et al does not expressly disclose that the factors include substituting up-sell factor, finding bundle products. However, it would have been obvious at the time

of the invention for Delurgio et al to include optimization factors such as up-sell, cross-sell, competitor. Delurgio et al provides specific motivation by disclosing that any well understood merchandising lever, the manipulation of whose attributes can be quantified and estimated with respect to consumer demand and whose associated costs can be determined via an activity based cost model are contemplated by the intention. (col 22: lines 60-64)

**Referring to claim 24:**

Delurgio et al does not expressly disclose return results that are ranked by a ranking factor used in the associated order sequence. However, Delurgio et al does disclose allowing the user to view the optimization results according to different options. (Fig 18; col 17: lines 41-45) Therefore, it is obvious from the disclosure that when user chose options (contribution margin method option, revenue method option..)to view the results then the results are ranked according to the chosen option.

**Referring to claim 28:**

Delurgio et al does not disclose that the advisory factor is up-sell and the calculated scenarios represent different scenarios of up-sell possibilities. However, it would have been obvious at the time of the invention for Delurgio et al to include optimizing scenarios involving up-sell products. Delurgio et al provides specific motivation by disclosing that any well understood merchandising lever, the manipulation of whose attributes can be quantified and estimated with respect to consumer demand and whose associated costs can be determined via an activity based cost model are contemplated by the intention. (col 22: lines 60-64)

**Referring to claim 29:**

Delurgio et al disclose optimizing product prices based on cross-sell products (Fig 26 bar soap and liquid soap). Delurgio et al does not expressly disclose optimizing and calculate different scenarios of cross-sell possibilities. However, it would have been obvious at the time of the invention for Delurgio et al to optimize and calculate different scenarios of cross-sell products. Delurgio et al provides specific motivation by disclosing that any well understood merchandising lever, the manipulation of whose attributes can be quantified and estimated with respect to consumer demand and whose associated costs can be determined via an activity based cost model are contemplated by the intention. (col 22: lines 60-64)

**Referring to claim 30:**

Delurgio et al disclose optimizing product prices based on competitor products (Fig 26 bar soap and liquid soap). Delurgio et al does not expressly disclose optimizing and calculate different scenarios of competitor product possibilities. However, it would have been obvious at the time of the invention for Delurgio et al to optimize and calculate different scenarios of cross-sell products. Delurgio et al provides specific motivation by disclosing that any well understood merchandising lever, the manipulation of whose attributes can be quantified and estimated with respect to consumer demand and whose associated costs can be determined via an activity based cost model are contemplated by the intention. (col 22: lines 60-64)

***Conclusion***

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7. Examiner's Note: Examiner has cited particular columns and line numbers in the references as applied to the claims below for the convenience of the applicant.

Although the specified citations are representative of the teachings in the art and are applied to the specific limitations within the individual claim, other passages and figures may apply as well. **It is respectfully requested that the applicant, in preparing the responses, fully consider the references in entirety as potentially teaching all or part of the claimed invention, as well as the context of the passage as taught by the prior art or disclosed by the examiner.**

8. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

U.S. Pat No. 5,873,069 to Reuhl et al.

U.S. Pat No. 5,878,400 to Carter III

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rob Wu whose telephone number is (571)272-3136.

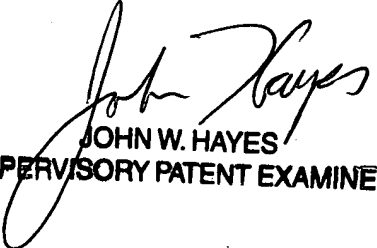
The examiner can normally be reached on Mon-Fri 8-5.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Hayes can be reached on (571)272-6708. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

rw

  
JOHN W. HAYES  
SUPERVISORY PATENT EXAMINER